


Please type a plus sign (+) inside this box → 

PTO/SB/05 (03-01)

Approved for use through 10/31/2002. OMB 0651-0032  
U.S. Patent and Trademark Office: U.S. DEPARTMENT OF COMMERCE

Under the Paperwork Reduction Act of 1995, no persons are required to respond to a collection of information unless it displays a valid OMB control number.

# UTILITY PATENT APPLICATION TRANSMITTAL

(Only for new nonprovisional applications under 37 C.F.R. 1.53(b))

Attorney Docket No. 2738-13

First Inventor Lester F. Ludwig

Title NON-POSITIVE-DEFINITE OPTICAL FILTERING FROM POSITIVE-  
DEFINITE TRANSFER FUNCTIONS

Express Mail Label No. EL 898590460 US

22278 U.S. PTO  
10/656342  
09/04/03

## APPLICATION ELEMENTS

See MPEP chapter 600 concerning utility patent application contents.

## ADDRESS TO:

Mail Stop: Patent Application  
Commissioner for Patents  
P.O. Box 1450  
Alexandria, VA 22313-1450

1. ☒ Fee Transmittal Form (e.g., PTO/SB/17)  
(Submit an original and a duplicate for fee processing)
2. ☒ Applicant claims small entity status.  
See 37 CFR 1.27.
3. ☒ Specification [Total Pages 35]  
(preferred arrangement set forth below)
  - Descriptive title of the Invention
  - Cross Reference to Related Applications
  - Statement Regarding Fed sponsored R & D
  - Reference to sequence listing, a table, or a computer program listing appendix
  - Background of the Invention
  - Brief Summary of the Invention
  - Brief Description of the Drawings (if filed)
  - Detailed Description
  - Claim(s)
  - Abstract of the Disclosure
4. ☒ Drawing(s) (35 U.S.C. 113) [Total Sheets 2]
5. ☒ Oath or Declaration [Total Pages 2]
  - a. ☒ Newly executed (original or copy)
  - b. ☐ Copy from a prior application (37 CFR 1.63 (d))  
(for a continuation/divisional with Box 18 completed)
  - i. ☐ **DELETION OF INVENTOR(S)**  
Signed statement attached deleting inventor(s)  
named in the prior application, see 37 CFR 1.63(d)(2) and 1.33(b).
6. ☐ Application Data Sheet. See 37 CFR 1.76

7. ☐ CD-ROM or CD-R in duplicate, large table or Computer Program (Appendix)
8. Nucleotide and/or Amino Acid Sequence Submission (if applicable, all necessary)
  - a. ☐ Computer Readable Form (CRF)
  - b. Specification Sequence Listing on:
    - i. ☐ CD-ROM or CD-R (2 copies); or
    - ii. ☐ paper
  - c. ☐ Statements verifying identity of above copies

## ACCOMPANYING APPLICATIONS PARTS

9. ☐ Assignment Papers (cover sheet & document(s))
10. ☐ 37 C.F.R. §3.73(b) Statement ☒ Power of Attorney  
(when there is an assignee)
11. ☐ English Translation Document (if applicable)
12. ☐ Information Disclosure Statement (IDS)/PTO-1449 ☐ Copies of IDS Citations
13. ☐ Preliminary Amendment
14. ☒ Return Receipt Postcard (MPEP 503)  
(Should be specifically itemized)
15. ☐ Certified Copy of Priority Document(s)  
(if foreign priority is claimed)
16. ☐ Nonpublication Request under 35 U.S.C. 122 (b)(2)(B)(i). Applicant must attach form PTO/SB/35 or its equivalent.
17. ☐ Other:

18. If a **CONTINUING APPLICATION**, check appropriate box, and supply the requisite information below and in a preliminary amendment, or in an Application Data Sheet under 37 CFR 1.76:

☐ Continuation ☒ Divisional ☐ Continuation-in-part (CIP)

of prior application No: 09 / 512,781

Prior application information: Examiner John Juba, Jr.

Group / Art Unit: 2872

For **CONTINUATION** or **DIVISIONAL APPS** only: The entire disclosure of the prior application, from which an oath or declaration is supplied under Box 5b, is considered a part of the disclosure of the accompanying or divisional application and is hereby incorporated by reference. The incorporation can only be relied upon when a portion has been inadvertently omitted from the submitted application parts.

## 17. CORRESPONDENCE ADDRESS

☒ Customer Number or Bar Code Label

00616

or ☐ Correspondence address below

(Insert Customer No. or Attach bar code label here)

Name

Address

City

State

Zip Code

Country

Telephone

Fax

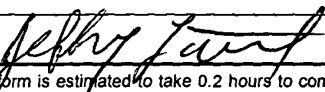
Name (Print/Type)

Jeffrey J. Lotspeich

Registration No. (Attorney/Agent)

45,737

Signature



Date

September 4, 2003

Burden Hour Statement: This form is estimated to take 0.2 hours to complete. Time will vary depending upon the needs of the individual case. Any comments on the amount of time you are required to complete this form should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, Washington, DC 20231. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. SEND TO: Commissioner for Patents, Mail Stop Patent Application, P.O. Box 1450, Alexandria, VA 22313-1450.

09/04/03  
16076 U.S. PTO

Under the Paperwork Reduction Act of 1995, no persons are required to respond to a collection of information unless it displays a valid OMB control number.

<h2 style="margin: 0;">FEE TRANSMITTAL</h2> <h3 style="margin: 0;">for FY 2003</h3> <p style="font-size: small; margin: 5px 0;">Patent fees are subject to annual revision.</p>		<p><i>Complete if Known</i></p> <table border="1" style="width: 100%; border-collapse: collapse;"> <tr> <td style="width: 50%;">Application Number</td> <td style="width: 50%;"></td> </tr> <tr> <td>Filing Date</td> <td>September 4, 2003</td> </tr> <tr> <td>First Named Inventor</td> <td>Lester F. Ludwig</td> </tr> <tr> <td>Examiner Name</td> <td>Unknown</td> </tr> <tr> <td>Group / Art Unit</td> <td>Unknown</td> </tr> <tr> <td>Attorney Docket No.</td> <td>2738-13</td> </tr> </table>		Application Number		Filing Date	September 4, 2003	First Named Inventor	Lester F. Ludwig	Examiner Name	Unknown	Group / Art Unit	Unknown	Attorney Docket No.	2738-13
Application Number															
Filing Date	September 4, 2003														
First Named Inventor	Lester F. Ludwig														
Examiner Name	Unknown														
Group / Art Unit	Unknown														
Attorney Docket No.	2738-13														
TOTAL AMOUNT OF PAYMENT	(\$)	582													

METHOD OF PAYMENT (check all that apply)	FEE CALCULATION (continued)																																																																																																																																																																																														
<p><input type="checkbox"/> Check   <input checked="" type="checkbox"/> Credit card   <input type="checkbox"/> Money Order   <input type="checkbox"/> Other   <input type="checkbox"/> None</p> <p><input type="checkbox"/> Deposit Account:</p> <table style="width: 100%; border-collapse: collapse;"> <tr> <td style="width: 30%;">Deposit Account Number</td> <td style="border: 1px solid black; padding: 2px;">020460</td> </tr> <tr> <td>Deposit Account Name</td> <td style="border: 1px solid black; padding: 2px;">THE MAXHAM FIRM</td> </tr> </table> <p>The Commissioner is authorized to: (check all that apply)</p> <p><input type="checkbox"/> Charge fee(s) indicated below   <input checked="" type="checkbox"/> Credit any overpayments</p> <p><input checked="" type="checkbox"/> Charge any additional fee(s) during the pendency of this application</p> <p><input type="checkbox"/> Charge fee(s) indicated below, except for the filing fee to the above-identified deposit account.</p>	Deposit Account Number	020460	Deposit Account Name	THE MAXHAM FIRM	<h4>3. ADDITIONAL FEES</h4> <table border="1" style="width: 100%; border-collapse: collapse;"> <thead> <tr> <th>Fee Code</th> <th>Large Entity Fee (\$)</th> <th>Small Entity Fee Code</th> <th>Small Entity Fee (\$)</th> <th>Fee Description</th> <th>Fee Paid</th> </tr> </thead> <tbody> <tr><td>1051</td><td>130</td><td>2051</td><td>65</td><td>Surcharge - late filing fee or oath</td><td></td></tr> <tr><td>1052</td><td>50</td><td>2052</td><td>25</td><td>Surcharge - late provisional filing fee or cover sheet</td><td></td></tr> <tr><td>1053</td><td>130</td><td>1053</td><td>130</td><td>Non-English specification</td><td></td></tr> <tr><td>1812</td><td>2,520</td><td>1812</td><td>2,520</td><td>For filing a request for reexamination</td><td></td></tr> <tr><td>1804</td><td>920*</td><td>1804</td><td>920*</td><td>Requesting publication of SIR prior to Examiner action</td><td></td></tr> <tr><td>1805</td><td>1,840*</td><td>1805</td><td>1,840*</td><td>Requesting publication of SIR after Examiner action</td><td></td></tr> <tr><td>1251</td><td>110</td><td>2251</td><td>55</td><td>Extension for reply within first month</td><td></td></tr> <tr><td>1252</td><td>410</td><td>2252</td><td>205</td><td>Extension for reply within second month</td><td></td></tr> <tr><td>1253</td><td>930</td><td>2253</td><td>465</td><td>Extension for reply within third month</td><td></td></tr> <tr><td>1254</td><td>1,450</td><td>2254</td><td>725</td><td>Extension for reply within fourth month</td><td></td></tr> <tr><td>1255</td><td>1,970</td><td>2255</td><td>985</td><td>Extension for reply within fifth month</td><td></td></tr> <tr><td>1401</td><td>320</td><td>2401</td><td>160</td><td>Notice of Appeal</td><td></td></tr> <tr><td>1402</td><td>320</td><td>2402</td><td>160</td><td>Filing a brief in support of an appeal</td><td></td></tr> <tr><td>1403</td><td>280</td><td>2403</td><td>140</td><td>Request for oral hearing</td><td></td></tr> <tr><td>1451</td><td>1,510</td><td>1451</td><td>1,510</td><td>Petition to institute a public use proceeding</td><td></td></tr> <tr><td>1452</td><td>110</td><td>2452</td><td>55</td><td>Petition to revive - unavoidable</td><td></td></tr> <tr><td>1453</td><td>1,300</td><td>2453</td><td>650</td><td>Petition to revive - unintentional</td><td></td></tr> <tr><td>1501</td><td>1,300</td><td>2501</td><td>650</td><td>Utility issue fee (or reissue)</td><td></td></tr> <tr><td>1502</td><td>470</td><td>2502</td><td>235</td><td>Design issue fee</td><td></td></tr> <tr><td>1503</td><td>630</td><td>2503</td><td>315</td><td>Plant issue fee</td><td></td></tr> <tr><td>1460</td><td>130</td><td>1460</td><td>130</td><td>Petitions to the Commissioner</td><td></td></tr> <tr><td>1807</td><td>50</td><td>1807</td><td>50</td><td>Processing fee under 37 CFR 1.17 (q)</td><td></td></tr> <tr><td>1806</td><td>180</td><td>1806</td><td>180</td><td>Submission of Information Disclosure Stmt</td><td></td></tr> <tr><td>8021</td><td>40</td><td>8021</td><td>40</td><td>Recording each patent assignment per property (times number of properties)</td><td></td></tr> <tr><td>1809</td><td>750</td><td>2809</td><td>375</td><td>Filing a submission after final rejection (37 CFR § 1.129(a))</td><td></td></tr> <tr><td>1810</td><td>750</td><td>2810</td><td>375</td><td>For each additional invention to be examined (37 CFR § 1.129(b))</td><td></td></tr> <tr><td>1801</td><td>750</td><td>2801</td><td>375</td><td>Request for Continued Examination (RCE)</td><td></td></tr> <tr><td>1802</td><td>900</td><td>1802</td><td>900</td><td>Request for expedited examination of a design application</td><td></td></tr> <tr><td colspan="5">Other fee (specify)</td><td></td></tr> <tr> <td colspan="5">*Reduced by Basic Filing Fee Paid</td> <td> <b>SUBTOTAL (3)</b>  <div style="border: 1px solid black; padding: 2px; display: inline-block;">(\$)</div> 0         </td> </tr> </tbody> </table>	Fee Code	Large Entity Fee (\$)	Small Entity Fee Code	Small Entity Fee (\$)	Fee Description	Fee Paid	1051	130	2051	65	Surcharge - late filing fee or oath		1052	50	2052	25	Surcharge - late provisional filing fee or cover sheet		1053	130	1053	130	Non-English specification		1812	2,520	1812	2,520	For filing a request for reexamination		1804	920*	1804	920*	Requesting publication of SIR prior to Examiner action		1805	1,840*	1805	1,840*	Requesting publication of SIR after Examiner action		1251	110	2251	55	Extension for reply within first month		1252	410	2252	205	Extension for reply within second month		1253	930	2253	465	Extension for reply within third month		1254	1,450	2254	725	Extension for reply within fourth month		1255	1,970	2255	985	Extension for reply within fifth month		1401	320	2401	160	Notice of Appeal		1402	320	2402	160	Filing a brief in support of an appeal		1403	280	2403	140	Request for oral hearing		1451	1,510	1451	1,510	Petition to institute a public use proceeding		1452	110	2452	55	Petition to revive - unavoidable		1453	1,300	2453	650	Petition to revive - unintentional		1501	1,300	2501	650	Utility issue fee (or reissue)		1502	470	2502	235	Design issue fee		1503	630	2503	315	Plant issue fee		1460	130	1460	130	Petitions to the Commissioner		1807	50	1807	50	Processing fee under 37 CFR 1.17 (q)		1806	180	1806	180	Submission of Information Disclosure Stmt		8021	40	8021	40	Recording each patent assignment per property (times number of properties)		1809	750	2809	375	Filing a submission after final rejection (37 CFR § 1.129(a))		1810	750	2810	375	For each additional invention to be examined (37 CFR § 1.129(b))		1801	750	2801	375	Request for Continued Examination (RCE)		1802	900	1802	900	Request for expedited examination of a design application		Other fee (specify)						*Reduced by Basic Filing Fee Paid					<b>SUBTOTAL (3)</b> <div style="border: 1px solid black; padding: 2px; display: inline-block;">(\$)</div> 0
Deposit Account Number	020460																																																																																																																																																																																														
Deposit Account Name	THE MAXHAM FIRM																																																																																																																																																																																														
Fee Code	Large Entity Fee (\$)	Small Entity Fee Code	Small Entity Fee (\$)	Fee Description	Fee Paid																																																																																																																																																																																										
1051	130	2051	65	Surcharge - late filing fee or oath																																																																																																																																																																																											
1052	50	2052	25	Surcharge - late provisional filing fee or cover sheet																																																																																																																																																																																											
1053	130	1053	130	Non-English specification																																																																																																																																																																																											
1812	2,520	1812	2,520	For filing a request for reexamination																																																																																																																																																																																											
1804	920*	1804	920*	Requesting publication of SIR prior to Examiner action																																																																																																																																																																																											
1805	1,840*	1805	1,840*	Requesting publication of SIR after Examiner action																																																																																																																																																																																											
1251	110	2251	55	Extension for reply within first month																																																																																																																																																																																											
1252	410	2252	205	Extension for reply within second month																																																																																																																																																																																											
1253	930	2253	465	Extension for reply within third month																																																																																																																																																																																											
1254	1,450	2254	725	Extension for reply within fourth month																																																																																																																																																																																											
1255	1,970	2255	985	Extension for reply within fifth month																																																																																																																																																																																											
1401	320	2401	160	Notice of Appeal																																																																																																																																																																																											
1402	320	2402	160	Filing a brief in support of an appeal																																																																																																																																																																																											
1403	280	2403	140	Request for oral hearing																																																																																																																																																																																											
1451	1,510	1451	1,510	Petition to institute a public use proceeding																																																																																																																																																																																											
1452	110	2452	55	Petition to revive - unavoidable																																																																																																																																																																																											
1453	1,300	2453	650	Petition to revive - unintentional																																																																																																																																																																																											
1501	1,300	2501	650	Utility issue fee (or reissue)																																																																																																																																																																																											
1502	470	2502	235	Design issue fee																																																																																																																																																																																											
1503	630	2503	315	Plant issue fee																																																																																																																																																																																											
1460	130	1460	130	Petitions to the Commissioner																																																																																																																																																																																											
1807	50	1807	50	Processing fee under 37 CFR 1.17 (q)																																																																																																																																																																																											
1806	180	1806	180	Submission of Information Disclosure Stmt																																																																																																																																																																																											
8021	40	8021	40	Recording each patent assignment per property (times number of properties)																																																																																																																																																																																											
1809	750	2809	375	Filing a submission after final rejection (37 CFR § 1.129(a))																																																																																																																																																																																											
1810	750	2810	375	For each additional invention to be examined (37 CFR § 1.129(b))																																																																																																																																																																																											
1801	750	2801	375	Request for Continued Examination (RCE)																																																																																																																																																																																											
1802	900	1802	900	Request for expedited examination of a design application																																																																																																																																																																																											
Other fee (specify)																																																																																																																																																																																															
*Reduced by Basic Filing Fee Paid					<b>SUBTOTAL (3)</b> <div style="border: 1px solid black; padding: 2px; display: inline-block;">(\$)</div> 0																																																																																																																																																																																										
<h4>1. BASIC FILING FEE</h4> <table border="1" style="width: 100%; border-collapse: collapse;"> <thead> <tr> <th>Large Fee Code</th> <th>Large Entity Fee (\$)</th> <th>Small Fee Code</th> <th>Small Entity Fee (\$)</th> <th>Fee Description</th> <th>Fee Paid</th> </tr> </thead> <tbody> <tr><td>1001</td><td>750</td><td>2001</td><td>375</td><td>Utility filing fee</td><td>375</td></tr> <tr><td>1002</td><td>330</td><td>2002</td><td>165</td><td>Design filing fee</td><td></td></tr> <tr><td>1003</td><td>520</td><td>2003</td><td>260</td><td>Plant filing fee</td><td></td></tr> <tr><td>1004</td><td>750</td><td>2004</td><td>375</td><td>Reissue filing fee</td><td></td></tr> <tr><td>1005</td><td>160</td><td>2005</td><td>80</td><td>Provisional filing fee</td><td></td></tr> <tr> <td colspan="5"><b>SUBTOTAL (1)</b></td> <td>(\$)</td> 375         </tr></tbody></table>	Large Fee Code	Large Entity Fee (\$)	Small Fee Code	Small Entity Fee (\$)	Fee Description	Fee Paid	1001	750	2001	375	Utility filing fee	375	1002	330	2002	165	Design filing fee		1003	520	2003	260	Plant filing fee		1004	750	2004	375	Reissue filing fee		1005	160	2005	80	Provisional filing fee		<b>SUBTOTAL (1)</b>					(\$)																																																																																																																																																					
Large Fee Code	Large Entity Fee (\$)	Small Fee Code	Small Entity Fee (\$)	Fee Description	Fee Paid																																																																																																																																																																																										
1001	750	2001	375	Utility filing fee	375																																																																																																																																																																																										
1002	330	2002	165	Design filing fee																																																																																																																																																																																											
1003	520	2003	260	Plant filing fee																																																																																																																																																																																											
1004	750	2004	375	Reissue filing fee																																																																																																																																																																																											
1005	160	2005	80	Provisional filing fee																																																																																																																																																																																											
<b>SUBTOTAL (1)</b>					(\$)																																																																																																																																																																																										

#### 2. EXTRA CLAIM FEES

Total Claims	43	-20 **	=	23	X	9	=	207
Independent Claims	3	-3 **	=	0	X		=	0
Multiple Dependent					X		=	0

Large Fee Code	Large Entity Fee (\$)	Small Fee Code	Small Entity Fee (\$)	Fee Description	Fee Paid
1202	18	2202	9	Claims in excess of 20	
1201	84	2201	42	Independent claims in excess of 3	
1203	280	2203	140	Multiple dependent claim, if not paid	
1204	84	2204	42	** Reissue independent claims over original patent	
1205	18	2205	9	** Reissue claims in excess of 20 and over original patent	
<b>SUBTOTAL (2)</b>					(\$)

\*\*or number previously paid, if greater; For Reissues, see above

  |

SUBMITTED BY				Complete (if applicable)	
Name (Print/Type)	Jeffrey J. Lotspeich	Registration No. Attorney/Agent	45,737	Telephone	619-233-9004
Signature				Date	September 4, 2003

**WARNING:** Information on this form may become public. Credit card information should not be included on this form. Provide credit card information and authorization on PTO-2038. Burden Hour Statement: This form is estimated to take 0.2 hours to complete. Time will vary depending upon the needs of the individual case. SEND TO: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450.

"EXPRESS MAIL" MAILING LABEL NO. EL 898590460 US

DATE OF DEPOSIT: September 4, 2003

I HEREBY CERTIFY THAT THESE PAPERS AND FEE ARE BEING  
DEPOSITED WITH THE UNITED STATES POSTAL SERVICE  
"EXPRESS MAIL POST OFFICE TO ADDRESSEE" SERVICE  
UNDER 37 CFR 1.10 ON THE DATE INDICATED ABOVE AND  
IS ADDRESSED TO MAIL STOP PATENT APPLICATION,  
COMMISSIONER FOR PATENTS, P.O. BOX 1450, ALEXANDRIA VA  
22313-1450.

BELINDA M. OWENS

(NAME)

Belinda Owens

(SIGNATURE)

EL898590460US